

MINUTE ITEM

6. UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, FAULT BLOCK II, WILMINGTON OIL FIELD, LOS ANGELES COUNTY - L.B.W.O. 10,100.

After consideration of Calendar Item 5 attached, and upon motion duly made and unanimously carried, the following resolution was adopted:

THE COMMISSION:

1. FINDS THAT THE UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, WITH ACCOMPANYING EXHIBITS, PROPOSED FOR FAULT BLOCK II, WILMINGTON OIL FIELD, INCLUDES TIDE AND SUBMERGED LANDS WHICH HAVE BEEN GRANTED BY THE STATE OF CALIFORNIA TO THE CITY OF LONG BEACH WITHOUT RESERVATION TO THE STATE OF THE RIGHT TO PRODUCE OIL OR GAS THEREFROM; THAT THE CITY OF LONG BEACH HAS SUBMITTED SUCH AGREEMENT TO THE STATE LANDS COMMISSION FOR APPROVAL; THAT SUCH AGREEMENT PROVIDES THAT ANY IMPAIRMENT OF THE PUBLIC TRUST FOR COMMERCE, NAVIGATION OR FISHERIES TO WHICH SAID GRANTED LANDS ARE SUBJECT IS PROHIBITED; AND, THAT THE ENTERING INTO AND THE PERFORMANCE OF SUCH AGREEMENT IS IN THE PUBLIC INTEREST.
2. APPROVES THE AFORESAID UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, WITH ACCOMPANYING EXHIBITS, ON BEHALF OF THE STATE, PURSUANT TO APPLICABLE LAW.

Attachment

Calendar Item 5 (4 pages)

CALENDAR ITEM

5.

UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, FAULT BLOCK II, WILMINGTON OIL FIELD, LOS ANGELES COUNTY - L.B.W.O. 10,100.

The City of Long Beach has submitted for approval by the State Lands Commission in accordance with applicable provisions of law, copies of the Unit Agreement and Unit Operating Agreement providing for the unitizing of all oil, gas, and other hydrocarbons produced from the unitized formations in Fault Block II of the Wilmington Oil Field. The purpose of the Agreement is to achieve the following: (1) To initiate and conduct repressuring operations in the unitized formations in an effort to arrest or ameliorate subsidence in the unit area in conformity with Article 5.5 of Chapter 1, Division 3, of the Public Resources Code of the State of California; (2) to promote the conservation of oil, gas, and other hydrocarbon substances in the unitized formation; and (3) to increase the maximum economic quantity of oil, gas, and other hydrocarbon substances ultimately recoverable from the unitized formations through repressuring operations.

Pursuant to the provisions of Section 3336 of the Public Resources Code, the State Oil and Gas Supervisor has determined that lands at or immediately adjacent to the Wilmington Oil Field are subsiding and established the boundaries of the subsidence area. In accordance with Section 3319, P.R.C., upon application and submission by the City of Long Beach of an engineering report and plan for repressuring operations in pools in the Wilmington Oil Field, which include the Tar, Ranger, Upper and Lower Terminal Zones of Fault Block II, the Supervisor held a public hearing and thereupon adopted the repressuring plan set forth, subject to specified requirements for work to be done under the plan.

The Unit Agreement and the Unit Operating Agreement, with accompanying exhibits, has been approved by the City Council of the City of Long Beach and by its Board of Harbor Commissioners, and resolutions have been adopted making the findings required precedent to entry into such agreements in compliance with the requirements of applicable laws of the State of California.

On July 13, 1959 (Minute Item 1, page 5009), the Commission approved a co-operative agreement, providing for the injection of water into the four Upper Zones of Fault Block II, by and between certain operators in Fault Block II, subject to the condition that the agreement shall terminate when Long Beach lands are committed to a Fault Block II unit.

The Unit Agreement and Unit Operating Agreement will become effective at 7 a.m. of the first day of the calendar month in which the last of the following conditions occurs:

1. The execution of the Agreement by the following parties: Union Pacific, General Petroleum, Ford, and Edison; or alternatively, all parties listed in Exhibit "A" of the Agreement.
2. The delivery of executed counterparts to the Union Pacific Railroad Company.

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3. The approval by the Supervisor under Section 3320.1(a) of the Public Resources Code.

The above requirements must be fulfilled prior to March 1, 1960, or the Agreement is of no further force or effect.

The Agreement shall remain in effect as long as unitized substances can be produced in commercially paying quantities, provided, however, at any time after 20 years from the effective date, the Working Interest Owners can terminate the Agreement upon making required determinations. Working Interest Owners shall mean the owners of an interest held in lands by virtue of fee title, including lands held in trust or by virtue of any lease under or pursuant to which the owner of such interest has the right to drill for, develop, and produce oil and gas. Working interest shall be deemed to be vested in the owner even though his rights to drill or produce may be delegated to a field contractor or an operator under a drilling and operating agreement, unit agreement or other type of agreement.

Under the Agreement, the Working Interest Owners shall exercise over-all supervision and control of all matters pertaining to the repressuring, development and operation of committed tracts and unitized formations and shall make determinations and such approvals as they may deem appropriate for the supervision and direction of the "Unit Co-ordinator" and "Unit Operator". Each Working Interest Owner shall have a voting interest equal to its unit participation. The Unit Co-ordinator under the direction of the Working Interest Owners shall have over-all supervision of all unit operations. The initial Unit Co-ordinator for Fault Block II will be the Union Pacific Railroad Company. The Fault Block II unit will be divided into two segments. The area south of Seaside Boulevard in the City of Long Beach is specified as Segment 1, with the City designated as the initial Unit Operator. The area north of Seaside Boulevard is specified as Segment 2, with the Union Pacific Railroad Company designated as Unit Operator. Under the Unit Co-ordinator, the Unit Operator will have direct control of all unit operations.

During the interim period which continues from the effective date of an agreement until engineering studies to determine tract equities for each tract have been completed, tract participation will be assigned to each tract in the ratio that the previous year's tract production bears to the total previous year's production from the unit, and each tract shall bear and pay for that part of the unit expense which is equal to the tract participation (except secondary costs of repressuring operations). Tract primary equity will be established on the estimated future recovery of crude oil, natural gas and water for each well. Secondary tract assignments will be based on originally oil saturated sands adjusted to natural water encroachment and oil sales price. The cost of secondary repressuring operations will be borne and paid for out of the secondary production allocated to each tract and shall include the cost of acquiring, drilling, redrilling, equipping water injection wells, converting oil wells to water injection wells, pumping and pipe line facilities, and the cost of water purchased for injection purposes.

The creation of a unit program providing for the allocation of production and the costs of continued development, production and repressurization of a segment

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of a complex oil-producing structure, under the control of numerous operators such as Fault Block II, imposes innumerable difficult prerequisites that must be resolved. The various committees under the direction of the Management Committee whose membership included trained personnel representing many operators in Fault Block II have established methods for allocating costs and unitized substances produced, to the respective tracts. The proposed technical administrative procedures of the Agreement appear to the staff to be reasonable and equitable. To insure flexibility for adjustment of owners' interests, the Unit Agreement provides for certain amendments to Unit Operating Agreement by the Working Interest Owners consistent with the terms of the Unit Agreement.

The general procedure of repressuring of an oil zone through water injection is an accepted oil field practice incident to increased oil recovery. In a "crash" program designed to inject large quantities of water in a minimum length of time (in the anticipation of ameliorating subsidence in addition to accomplishing secondary recovery), many short cuts and assumptions in making calculations must be taken. It is likely that certain essential parts of the proposed water flood program may not conform with the technical and administrative procedures most desired by oil-producing companies. Water-flooding operations usually proceed slowly and result from the evaluation of pilot floods, and are designed solely to increase ultimate economic oil recovery, and thus allow time for making detailed engineering studies of the results of injection so that corrective measures may be taken to insure minimum of bypassing of oil, maximum number of sand sections repressured, and the prevention of migration of oil into areas not included in the unit. Completely detailed engineering studies, according to an advance schedule by wells, for injection, production and testing must be made, kept current and analyzed by an adequate staff to properly guide the water injection program and correct for deviations from desired performance. It is anticipated that unitization will result in a more effective long-term economic secondary recovery program.

The Unit Agreement, Unit Operating Agreement and exhibits thereto have been reviewed as to legality by the office of the Attorney General who has advised that the proposed Agreement conforms with applicable provisions of law as to legal sufficiency, and that it may be approved by the State Lands Commission subject to favorable findings by the staff as to administrative and engineering feasibility and merit thereof.

IT IS RECOMMENDED THAT THE COMMISSION:

1. FIND THAT THE UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, WITH ACCOMPANYING EXHIBITS, PROPOSED FOR FAULT BLOCK II, WILMINGTON OIL FIELD, INCLUDES TIDE AND SUBMERGED LANDS WHICH HAVE BEEN GRANTED BY THE STATE OF CALIFORNIA TO THE CITY OF LONG BEACH WITHOUT RESERVATION TO THE STATE OF THE RIGHT TO PRODUCE OIL OR GAS THEREFROM; THAT THE CITY OF LONG BEACH HAS SUBMITTED SUCH AGREEMENT TO THE STATE LANDS COMMISSION FOR APPROVAL; THAT SUCH AGREEMENT PROVIDES THAT ANY IMPAIRMENT OF THE PUBLIC TRUST FOR COMMERCE, NAVIGATION OR FISHERIES TO WHICH SAID GRANTED LANDS ARE SUBJECT IS PROHIBITED; AND, THAT THE ENTERING INTO AND THE PERFORMANCE OF SUCH AGREEMENT IS IN THE PUBLIC INTEREST.

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2. APPROVE THE AFORESAID UNIT AGREEMENT AND UNIT OPERATING AGREEMENT, WITH ACCOMPANYING EXHIBITS, ON BEHALF OF THE STATE, PURSUANT TO APPLICABLE LAW.